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Housekeeper's Chat

Thursday, August 14, 1930.

NOT FOR PUBLICATION

Subject: "Weather as it Comes from the Weather Bureau". Information approved by the U. S. Weather Bureau, U. S. D. A.

Publication available: "Handbook of the Weather Bureau."

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At breakfast the other day I was planning a picnic lunch in Rock Creek Park for the early afternoon.

"Better not picnic today," said Uncle Ebenezer, from the depths of his newspaper. That's one habit I've never been able to reform -- reading the paper at the breakfast table. I'd like to meet a woman who has succeeded!

"Why shouldn't we have a picnic?" I asked, "It's a perfectly beautiful day -- clear and cool, with the most tempting little breezes blowing."

"Going to rain. Thunderstorm," said Uncle Ebenezer. "Paper says so."

"Well, the weather man's sometimes wrong," I said. "I guess I'll take a chance this time."

So I did -- and you can guess what happened. The thunderstorm came up just as I had spread out the entire lunch. The less said about the next half hour the better. I expect you've all had picnics like that -- ending in a dragged anticlimax.

"The weather man was right," I admitted at dinner that night.

The only thing Uncle Ebenezer said by way of "I-told-you-so" was to suggest that I go over and talk to the people at the Weather Bureau one of these days. "Don't you know it's part of your own U. S. Department of Agriculture?"

"Why, of course it is!" I said. And so I took my very first opportunity yesterday morning and made a visit to the Weather Bureau.

I had no idea what a fascinating place it would be. It's located at some distance from the other buildings that house our Department of Agriculture. The chief, Dr. Charles A. Marvin, who is popularly known as the "Weather man," doesn't actually do the forecasting personally. Trained scientists in one of the bureau's many divisions receive the weather reports from all over the country, and prepare different kinds of weather maps and forecasts.

I discovered two of Dr. Marvin's special interests during my visit. One is studies of solar radiation, and the other is the proposed thirteen-month calendar. I don't believe I could ever understand the theory of solar radiation myself, much less explain it to anybody else. But I'm very much in favor of having thirteen months, of 28 days each, with an extra holiday between the last day of the old year and the first of the new. Some day I'll tell you all about it.

Meantime, let's visit as much of the Weather Bureau as we have time for.

Up in the instrument room you can see the devices which are used in all important weather stations for recording temperature and barometric changes, the direction and velocity of the winds, the amount of sunshine and rainfall, and many other facts that must be known in studying the weather and making predictions.

The Weather Bureau at Washington is the headquarters for collecting all weather observations by telegraph. There are also a number of special centers covering large districts, such as Chicago, St. Louis, or San Francisco, where information applying chiefly to a given region is picked up and interpreted. Regular weather observations are sent twice a day, at 8 in the morning and 8 in the evening, from over 200 places scattered all over the United States.

Reports come in also from many places outside of the United States. They are sent from many points in Canada, from islands in the Pacific and Atlantic Oceans and from places along the Gulf of Mexico. I was told that the weather observer in the most northern station in Alaska, Point Barrow, is a woman, the wife of the signal corps officer in that lonely spot. Wasn't that interesting?

Here we are in the forecasting room. There are about half a dozen high desks down the center of the room. At each desk a man is standing. He has a book of large maps in front of him. The chief forecaster is receiving and reading the telegraphic reports at one end of the room. He calls off the information as fast as he can decode it. All messages are in code -- not to make them secret, but to insure accuracy.

One recorder takes down everything about temperature, and nothing else. When he has finished he can draw a line connecting places having the same temperature right across the whole map of the United States. These lines are pictures of the movement of hot or cold weather, according to the season.

Another records precipitation on his map. (That means rain or snow.) A third notes barometric pressure, a fourth clouds, another winds, and one person has an "upper air" map. However, another division of the bureau, a system of observations for the benefit of flyers is conducted on a much more comprehensive scale than is done in the daily morning and afternoon weather forecasts.

Cold waves and bad weather often move down on the United States from the Arctic Ocean and Northern Canada in a southeasterly direction, while hurricanes and other storms of tropical origin are apt to start in the Atlantic Ocean and move in a northwest direction. Sometimes they expend themselves without being heard of on the mainland, and sometimes they cause great havoc in Florida and along the Gulf Coast.

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By studying the various maps, after the observations for the day have been read, a trained forecaster can see at a glance in what direction weather phenomena are moving. For instance, we saw a map in which a tropical storm center appeared somewhere southeast of the West Indies. The map for each day following showed how the storm center moved onward. From the direction and velocity of the wind and other signs, a forecaster can tell when such a storm will reach our mainland. The Weather Bureau then orders storm warnings displayed and notices published to prevent ships from starting out and to enable people to safeguard property if possible.

In a similar way a movement of very hot or very cold weather can be followed across the continent. Sometimes it happens that a weather movement is deflected by encountering winds moving in a different direction, or through other atmospheric causes. When a local forecast is made it is based on both the general weather movement likely to pass that place and on observations in the immediate vicinity. Many factors may enter into the local situation to change the trend of the weather, but in a great many cases the prediction is fulfilled.

Usually in less than two hours from the time the morning observations are taken the forecasts are telegraphed all over the country. The information for the little box devoted to the weather which you see at the top of the newspaper is electrically telegraphically printed right at the weather bureau. Telephone, radio and mail carry the report everywhere.

I wish I had time to tell you about the River and Flood Division, which warns people of rising river stages in the great river valleys; or the Climatological division which takes charges of all weather information for particular places, and which will tell you almost anything you need to know about the weather and climate of any district you are interested in; or the Aeronautical division, which is of such great value to flyers. Next time you look up into the sky to follow the hum of a plane remember that the pilot did not start until he had assured himself that the upper air weather would be favorable for safe flying.

Was it Mark Twain who once said, "People are always talking about the weather, but nothing is ever done about it"?

A great deal is being done about it, don't you think?

I won't have time to give you a menu today, but tomorrow I'll tell you what we took on our ill-fated picnic.

Friday: "When We Eat Along the Roadside."

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London

18th Dec 1891

My dear Sir

I have the pleasure to inform you that your letter of the 11th inst. has been received and the same has been forwarded to the proper authorities for their consideration.

Yours faithfully

W. H. Smith

W. H. Smith & Co.